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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/270,733	03/16/1999	DAVID MACDONALD DELANEY	10346RO	2879

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NORTEL NETWORKS LIMITED  
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CANADA

EXAMINER

HARPER, KEVIN C

ART UNIT	PAPER NUMBER
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2666

DATE MAILED: 03/12/2004 11

Please find below and/or attached an Office communication concerning this application or proceeding.

PM

# Office Action Summary

Application No.

09/270,733

Applicant(s)

DELANEY ET AL.

Examiner

Kevin C. Harper

Art Unit

2666

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 18 December 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-56 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 8, 18, 28 and 31 is/are allowed.
- 6) ☒ Claim(s) 1-7 9-17 19-27 29-30 32-34 41-42 44-56 is/are rejected.
- 7) ☒ Claim(s) 35-40 and 43 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 7.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

***Response to Arguments***

Applicant's arguments of the previous response, pages 23-24, last paragraphs, filed December 18, 2003, have been fully considered and are persuasive. Therefore, the previous rejections have been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of Belser et al. The indicated allowability of claims 18, 28 and 31-44 is withdrawn in view of the newly discovered reference(s) to Belser et al. Rejections based on the newly cited reference(s) follow.

***Claim Rejections - 35 USC § 103***

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 1-7, 9-17, 19-26, 29-30 and 45-56 are rejected under 35 U.S.C. 103(a) as being unpatentable over Belser et al. (US 6,151,324) in view of Stone (US 6,041,057).

1. Regarding claims 1-5, 7, 9-15, 17, 19-25, 29-30, 45-51 and 53-56, Belser discloses a method for routing packets through appropriate trunks of a network having a distinct set of virtual ports (Figure 5, Red VLAN or Blue VLAN) where no virtual port belongs to more than one of the distinct sets. The method comprises assigning and adding a respective egress address to each packet entering the network via an ingress virtual port (Figure 1, Figure 2A, items 31-32 and 34, and Figures 3A and 3B; col. 4, lines 22-32). The egress address corresponds to a unicast or multicast destination address of the packet when a correspondence is known (Figure 4C; col. 11, lines 22-26). The packet is routed across the network according to the added egress address from the ingress virtual port to at least one egress virtual port associated with the assigned egress address (Figures 1 and 3B). The routing is restricted to the distinct set of ports (col. 11, lines 22-26; col. 5, lines 49-51

Art Unit: 2666

and 60-63). The egress address is removed from the packet to provide a restored packet (Figure 3B, items 30 at egress switch and destination end station). Belser discloses point-to-multipoint broadcast VLAN connectivity (col. 11, lines 22-26) but does not disclose that the egress address is a broadcast egress address when no correspondence between the destination address and the egress address is known. Stone discloses that an unknown destination address is mapped to a broadcast VLAN address (col. 7, lines 45-51; col. 6, lines 38-42). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to map an unknown destination address to a broadcast VLAN address in the invention of Belser in order to allow packets to be routed properly when the destination address is incorrect or not provided by an end user. Further regarding claims 53-56, the address assigner is the ingress switch.

2. Regarding claims 6, 16, 26 and 52, in Belser, an ingress address is mapped and assigned to each packet entering the network (Figure 2B, item 41 and 44) based on address association tables (Figure 6A; col. 6, lines 8-18).

Claims 7, 27, 32-34, 41 and 44 are rejected under 35 U.S.C. 103(a) as being unpatentable over Belser et al. (US 6,151,324) in view of Stone (US 6,041,057) and Ross (US 5,394,402).

3. The limitations of claims 7, 27, 32-33 and 41, have been addressed in the rejection of claim 1 above, except that Belser in view of Stone does not disclose encapsulating a packet with an egress address. Ross discloses an encapsulated packet containing an egress address within a backbone network (Figures 4 and 6). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to encapsulate a packet in the invention of Belser in view of Stone in order to simplify the processing of ingress packets only adding header information to the packet.

4. Regarding claim 34, in Belser, the switches and routers provide IEEE 802.1 switching functionality (col. 2, lines 38-49; col. 6, lines 19-32).

Art Unit: 2666

5. Regarding claims 42 and 44, in Belser, the address identifier and address assigner is the ingress switch.

*Allowable Subject Matter*

1. Claims 8, 18, 28 and 31 are allowed.
2. Claims 35-40 and 43 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

*Conclusion*

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kevin Harper whose telephone number is 703-305-0139. The examiner can normally be reached weekdays, except Wednesday, from 9:30 AM to 8:00 PM ET.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Seema S. Rao, can be reached at 703-308-5463. The fax number for Technology Center (TC) 2600 is 703-872-9314.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Customer Service Office for TC 2600 at 703-306-0377.

Kevin C. Harper



March 8, 2004

Seema S. Rao  
SEEMA S. RAO 3/8/04  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 2600